ELSEVIER

Chemical Geology 155 (1999) 339–340

CHEMICAL GEOLOGY
INCLUDING
ISOTOPE GEOSCIENCE

Contents Volume 155, 1999

Vol. 155, Nos. 1–2

Editorial 1

Research Papers

Low-temperature fluid–rock interaction—an isotopic and mineralogical perspective of upper crustal evolution, eastern flank of the Juan de Fuca Ridge (JdFR), ODP Leg 168
A.G. Hunter, P.D. Kempton and P. Greenwood 3

Mineralogical and geochemical features of sulfide chimneys from the MESO zone, Central Indian Ridge
U. Münch, N. Blum and P. Halbach 29

Pb isotope study of black-smokers and basalts from Pito Seamount site (Easter microplate)
C. Verati, J. Lancelot and R. Hékinian 45

Geochemistry of a hydrothermal sediment core from the OBS vent-field, 21°N East Pacific Rise
C.R. German, J. Hergt, M.R. Palmer and J.M. Edmond 65

Comparing yttrium and rare earths in hydrothermal fluids from the Mid-Atlantic Ridge: implications for Y and REE behaviour during near-vent mixing and for the Y/Ho ratio of Proterozoic seawater
M. Bau and P. Dulski 77

Hydrothermal rare earth elements mineralization in the Barra do Itapirapuã carbonatite, southern Brazil: behaviour of selected trace elements and stable isotopes (C, O)
F.R.D. Andrade, P. Möller, V. Lüders, P. Dulski and H.A. Gilg 91

Rare earth element and isotope (C, O, Sr) characteristics of hydrothermal carbonates: genetic implications for dolomite-hosted talc mineralization at Göpfersgrün (Fichtelgebirge, Germany)
L. Hecht, R. Freiberger, H.A. Gilg, G. Grundmann and Y.A. Kostitsyn 115

The Paleoproterozoic Dorlin gold deposit, French Guiana: genetic constraints of the stable isotope geochemistry
C. Lerouge, J.-P. Milési and A.-M. Fouillac 131

A fossil hydrothermal system or a source-bed in the Madiyi Formation near the Xiangxi Au–Sb–W deposit, NW Hunan, PR China?
S.X. Yang and N. Blum 151

Modeling coupled heat and mass transport applied to the hydrothermal system of the Upper Harz Mountains (Germany)
R. Ondrak and P. Möller 171

Vol. 155, Nos. 3–4

Research Papers

Trace element and Nd–Sr isotope constraints on origin of the Chifeng flood basalts, North China
B.-f. Han, S.-g. Wang and H. Kagami 187

Crustal control in the genesis of Plio-Quaternary bimodal magmatism of the Main Ethiopian Rift (MER): geochemical and isotopic (Sr, Nd, Pb) evidence
T. Trua, C. Deniel and R. Mazzuoli 201

Crystal-chemical controls on rare-earth element concentrations in fossil biogenic apatites and implications for paleoenvironmental reconstructions
B. Reynard, C. Lécuyer and P. Grandjean 233

Interactions of calcareous suspended sediment with glacial meltwater: a field test of dissolution behaviour
I.J. Fairchild, J.A. Killawee, B. Hubbard and W. Dreybrodt 243

Geochemistry of the loessic sediments on Delhi ridge, eastern Thar desert, Rajasthan: implications for exogenic processes
J.K. Tripathi and V. Rajamani 265
Topographic development of the Southern Alps recorded by the isotopic composition of authigenic clay minerals, South Island, New Zealand
C.P. Chamberlain, M.A. Poage, D. Craw and R.C. Reynolds. 279
The origin and evolution of Canadian Shield brines: evaporation or freezing of seawater? New lithium isotope and geochemical evidence from the Slave craton
D.J. Bottomley, A. Katz, L.H. Chan, A. Starinsky, M. Douglas, I.D. Clark and K.G. Raven 295

Isotope Geoscience Section
Tc/Ru fractionation in the Oklo and Bangombé natural fission reactors, Gabon
H. Hidaka, P. Holliger and F. Gauthier-Lafaye 323

Book review
Geomicrobiology: interactions between microbes and minerals
K.O. Konhauser 335

Contents of Volume 155, 1999 339

Cumulative Article index Volumes 144–152. 341

Cumulative Author index Volumes 144–152 351

Cumulative Subject index Volumes 144–152 361